

DT20 Rec'd PCT/PTO 16 JAN 2003

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FROM : JHU/APL OFFICE OF COUNSEL

FAX NO. : 2402285254

Jan. 16 2003 03:26PM P1

IN THE UNITED STATES RECEIVING OFFICE (RO/US)

JHU/APL Docket No. 1486-SPL

VIA FAX NO. 703-746-9195

International application No. PCT/US01/06016

6 pages total

International filing date: 23 February 01

Inventors: Carleton S. Hayek, et al.

Applicant: THE JOHNS HOPKINS UNIVERSITY

For: SYSTEM AND METHOD FOR DIAGNOSING PATHOLOGIC HEART
CONDITIONS

FILING RECEIPT CORRECTION

Assistant Commissioner for Patents
Office of Initial Patent Examination's
Filing Receipt Corrections
Box PCT
Washington, D. C. 20231

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FEB 24 2003

TECHNOLOGY CENTER R3700

Dear Sir:

The Domestic Priority data as claimed by applicant shown on the Replacement Filing Receipt (copy enclosed) is incorrect. The international filing date of PCT/US01/06016 is 02/23/01 (See attached Form PCT/IB/308) and not 02/13/2001 as shown on the Replacement Filing Receipt. PCT/US01/06016 claims priority from provisional application No. 60/184,375, filed 2/23/00.

If you have any questions, please contact me by: phone: (240) 228-5640; fax: (240) 228-5254; or e-mail: Frank.Cooch@jhuapl.edu.

Respectfully submitted,

Francis A. Cooch

Francis A. Cooch
Attorney for Applicant
Registration No. 31,495
Date 16 January 2003

FACooch/jc

I hereby certify that this correspondence is being facsimile transmitted to the Patent and Trademark Office on

16 January 2003

Francis A. Cooch

1/16/03



Commissioner for Patents
Washington, DC 20591
www.uspto.gov

| APPLICATION NUMBER | FILING DATE | GRP ART UNIT | FIL FEE REC'D | ATTY.DOCKET.NO | DRAWINGS | TOT CLAIMS | IND CLAIMS |
|--------------------|-------------|--------------|---------------|----------------|----------|------------|------------|
| 10/048,110 | 01/25/2002 | 3762 | 817 | 1486-ARMY | 6 | 24 | 7 |

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CONFIRMATION NO. 1583

Francis A Cooch
The Johns Hopkins University
Applied Physics Laboratory
11100 Johns Hopkins Road
Laurel, MD 20723-6099

1/23/02 FAC

REPLACEMENT FILING RECEIPT



OC000000009152652

12/3/02

Date Mailed: 11/25/2002

Receipt is acknowledged of this regular Patent Application. It will be considered in its order and you will be notified as to the results of the examination. Be sure to provide the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION when inquiring about this application. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. If an error is noted on this Filing Receipt, please write to the Office of Initial Patent Examination's Filing Receipt Corrections, facsimile number 703-746-9195. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections (if appropriate).

Applicant(s)

Carleton S. Hayek, Ellicott City, MD;
W. Reid Thompson, Baltimore, MD;
Joseph S. Lombardo, Annapolis, MD;
Lisa A. Blodgett, Ellicott City, MD;
Charles B. Cooperman, Highland, MD;

Domestic Priority data as claimed by applicant

This application is a 371 of PCT/US01/06016-02/19/2001.

(*)Data provided by applicant is not consistent with PTO records.

2/23/01

Foreign Applications

Projected Publication Date: To Be Determined - pending completion of Security Review

Non-Publication Request: No

Early Publication Request: No

** SMALL ENTITY **

Title

System and method for diagnosing pathologic heart conditions**Preliminary Class**

600

**LICENSE FOR FOREIGN FILING UNDER
Title 35, United States Code, Section 184
Title 37, Code of Federal Regulations, 5.11 & 5.15****GRANTED**

The applicant has been granted a license under 35 U.S.C. 184, if the phrase "IF REQUIRED, FOREIGN FILING LICENSE GRANTED" followed by a date appears on this form. Such licenses are issued in all applications where the conditions for issuance of a license have been met, regardless of whether or not a license may be required as set forth in 37 CFR 5.15. The scope and limitations of this license are set forth in 37 CFR 5.15(a) unless an earlier license has been issued under 37 CFR 5.15(b). The license is subject to revocation upon written notification. The date indicated is the effective date of the license, unless an earlier license of similar scope has been granted under 37 CFR 5.13 or 5.14.

This license is to be retained by the licensee and may be used at any time on or after the effective date thereof, unless it is revoked. This license is automatically transferred to any related application(s) filed under 37 CFR 1.53(d). This license is not retroactive.

The grant of a license does not in any way lessen the responsibility of a licensee for the security of the subject matter as imposed by any Government contract or the provisions of existing laws relating to espionage and the national security or the export of technical data. Licensees should apprise themselves of current regulations especially with respect to certain countries, of other agencies, particularly the Office of Defense Trade Controls, Department of State (with respect to Arms, Munitions and Implements of War (22 CFR 121-128)); the Office of Export Administration, Department of Commerce (15 CFR 370.10 (j)); the Office of Foreign Assets Control, Department of Treasury (31 CFR Parts 500+) and the Department of Energy.

NOT GRANTED

No license under 35 U.S.C. 184 has been granted at this time, if the phrase "IF REQUIRED, FOREIGN FILING LICENSE GRANTED" DOES NOT appear on this form. Applicant may still petition for a license under 37 CFR 5.12, if a license is desired before the expiration of 6 months from the filing date of the application. If 6 months has lapsed from the filing date of this application and the licensee has not received any indication of a secrecy order under 35 U.S.C. 181, the licensee may foreign file the application pursuant to 37 CFR 5.15(b).

FILING RECEIPT

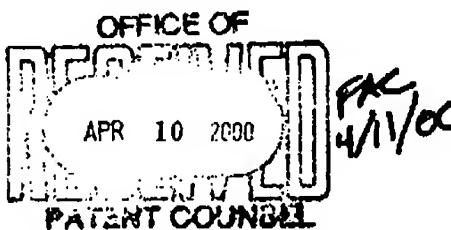
OC00000005036392


**UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office**

 Address: ASSISTANT SECRETARY AND
COMMISSIONER OF PATENT AND TRADEMARKS
Washington, D.C. 20231

| APPLICATION NUMBER | FILING DATE | GRP ART UNIT | FIL FEE REC'D | ATTY.DOCKET.NO | DRAWINGS | TOT CLAIMS | IND CLAIMS |
|--------------------|-------------|--------------|------------------|----------------|----------|------------|------------|
| 60/184,375 | 02/23/2000 | 75 | 1486-Army PRV | - | | | |

Office of Patent Counsel
 The Johns Hopkins University
 Applied Physics Laboratory
 11100 Johns Hopkins Road
 Laurel, MD 20723-6099



Date Mailed: 04/07/2000

Receipt is acknowledged of this provisional Patent Application. It will be considered in its order and you will be notified as to the results of the examination. Be sure to provide the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION when inquiring about this application. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. If an error is noted on this Filing Receipt, please write to the Office of Initial Patent Examination's Customer Service Center. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the PTO processes the reply to the Notice, the PTO will generate another Filing Receipt incorporating the requested corrections (if appropriate).

Applicant(s)

Lisa A. Blodgett, Ellicott City, MD ;
 Charles B. Cooperman, Highland, MD ;
 Carlton S. Hayek, Ellicott City, MD ;
 Joseph S. Lombardo, Annapolis, MD ;
 W. Reid Thompson III, Baltimore, MD ;

Continuing Data as Claimed by Applicant**Foreign Applications****** SMALL ENTITY ******Title**

Auscultation diagnostic method

Preliminary Class

Data entry by : YON, LOWUAN

Team : OIPE

Date: 04/07/2000



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|--|--|---|--|--|
| FORM PTO-1390 (Modified) REV 11-2000 | | U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE | | ATTORNEY'S DOCKET NUMBER 1486-ARMY |
| TRANSMITTAL LETTER TO THE UNITED STATES DESIGNATED/ELECTED OFFICE (DO/EO/US) CONCERNING A FILING UNDER 35 U.S.C. 371 | | | | U.S. APPLICATION NO. (IF KNOWN, SEE 37 CFR |
| INTERNATIONAL APPLICATION NO. PCT/US01/06016 | INTERNATIONAL FILING DATE 23 February 2001 | PRIORITY DATE CLAIMED 23 February 2000 | | |
| TITLE OF INVENTION SYSTEM AND METHOD FOR DIAGNOSING PATHOLOGIC HEART CONDITIONS | | | | |
| APPLICANT(S) FOR DO/BO/US Carlton S. Hayek, W. Reid Thompson, Joseph S. Lombardo, Lisa A. Blodgett and Charles B. Cooperman | | | | |
| Applicant herewith submits to the United States Designated/Elected Office (DO/BO/US) the following items and other information: | | | | |
| <ol style="list-style-type: none"> 1. <input checked="" type="checkbox"/> This is a FIRST submission of items concerning a filing under 35 U.S.C. 371. 2. <input type="checkbox"/> This is a SECOND or SUBSEQUENT submission of items concerning a filing under 35 U.S.C. 371. 3. <input checked="" type="checkbox"/> This is an express request to begin national examination procedures (35 U.S.C. 371(f)). The submission must include items (5), (6), (9) and (24) indicated below. 4. <input checked="" type="checkbox"/> The US has been elected by the expiration of 19 months from the priority date (Article 31). 5. <input checked="" type="checkbox"/> A copy of the International Application as filed (35 U.S.C. 371 (c) (2)) <ol style="list-style-type: none"> a. <input type="checkbox"/> is attached hereto (required only if not communicated by the International Bureau). b. <input type="checkbox"/> has been communicated by the International Bureau. c. <input checked="" type="checkbox"/> is not required, as the application was filed in the United States Receiving Office (RO/US). 6. <input type="checkbox"/> An English language translation of the International Application as filed (35 U.S.C. 371(c)(2)). <ol style="list-style-type: none"> a. <input type="checkbox"/> is attached hereto. b. <input type="checkbox"/> has been previously submitted under 35 U.S.C. 154(d)(4). 7. <input checked="" type="checkbox"/> Amendments to the claims of the International Application under PCT Article 19 (35 U.S.C. 371 (c)(3)) <ol style="list-style-type: none"> a. <input checked="" type="checkbox"/> are attached hereto (required only if not communicated by the International Bureau). b. <input type="checkbox"/> have been communicated by the International Bureau. c. <input type="checkbox"/> have not been made; however, the time limit for making such amendments has NOT expired. d. <input type="checkbox"/> have not been made and will not be made. 8. <input type="checkbox"/> An English language translation of the amendments to the claims under PCT Article 19 (35 U.S.C. 371(c)(3)). 9. <input checked="" type="checkbox"/> An oath or declaration of the inventor(s) (35 U.S.C. 371 (c)(4)). 10. <input type="checkbox"/> An English language translation of the annexes to the International Preliminary Examination Report under PCT Article 36 (35 U.S.C. 371 (c)(5)). 11. <input type="checkbox"/> A copy of the International Preliminary Examination Report (PCT/IPEA/409). 12. <input checked="" type="checkbox"/> A copy of the International Search Report (PCT/ISA/210). | | | | |
| Items 13 to 20 below concern document(s) or information included: | | | | |
| <ol style="list-style-type: none"> 13. <input type="checkbox"/> An Information Disclosure Statement under 37 CFR 1.97 and 1.98. 14. <input type="checkbox"/> An assignment document for recording. A separate cover sheet in compliance with 37 CFR 3.28 and 3.31 is included. 15. <input type="checkbox"/> A FIRST preliminary amendment. 16. <input type="checkbox"/> A SECOND or SUBSEQUENT preliminary amendment. 17. <input type="checkbox"/> A substitute specification. 18. <input type="checkbox"/> A change of power of attorney and/or address letter. 19. <input type="checkbox"/> A computer-readable form of the sequence listing in accordance with PCT Rule 13ter.2 and 35 U.S.C. 1.821 - 1.825. 20. <input type="checkbox"/> A second copy of the published international application under 35 U.S.C. 154(d)(4). 21. <input type="checkbox"/> A second copy of the English language translation of the international application under 35 U.S.C. 154(d)(4). 22. <input checked="" type="checkbox"/> Certificate of Mailing by Express Mail 23. <input type="checkbox"/> Other items or information: | | | | |

PATENT COOPERATION TREATY

PCT

NOTICE INFORMING THE APPLICANT OF THE
COMMUNICATION OF THE INTERNATIONAL
APPLICATION TO THE DESIGNATED OFFICES

(PCT Rule 47.1(c), first sentence)

From the INTERNATIONAL BUREAU

To:

COOCH, Francis, A.
 The Johns Hopkins University
 Applied Physics Laboratory
 11100 Johns Hopkins Road
 Laurel, MD 20723-6099
 ETATS-UNIS D'AMERIQUE

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File
9/10/01 SEP 10 2001

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|---|---|
| Date of mailing (day/month/year) 30 August 2001 (30.08.01) | |
| Applicant's or agent's file reference 1486 | |
| International application No. PCT/US01/06016 | International filing date (day/month/year) 23 February 2001 (23.02.01) |
| Priority date (day/month/year) 23 February 2000 (23.02.00) | |
| Applicant THE JOHNS HOPKINS UNIVERSITY et al | |

OFFICE OF THE
INTERNATIONAL BUREAU
IMPORTANT NOTICE

1. Notice is hereby given that the International Bureau has communicated, as provided in Article 20, the international application to the following designated Offices on the date indicated above as the date of mailing of this Notice:
KP,KR,US

In accordance with Rule 47.1(c), third sentence, those Offices will accept the present Notice as conclusive evidence that the communication of the international application has duly taken place on the date of mailing indicated above and no copy of the international application is required to be furnished by the applicant to the designated Office(s).

2. The following designated Offices have waived the requirement for such a communication at this time:
AE,AG,AL,AM,AP,AT,AU,AZ,BA,BB,BG,BR,BY,BZ,CA,CH,CN,CR,CU,CZ,DE,DK,DM,DZ,EA,EE,EP,
ES,FI,GB,GD,GE,GH,GM,HR,HU,ID,IL,IN,IS,JP,KE,KG,KZ,LC,LK,LR,LS,LT,LU,LV,MA,MD,MG,
MK,MN,MW,MX,MZ,NO,NZ,OA,PL,PT,RO,RU,SD,SE,SG,SI,SK,SL,TJ,TM,TR,TT,TZ,UA,UG,UZ,VN,

The communication will be made to those Offices only upon their request. Furthermore, those Offices do not require the applicant to furnish a copy of the international application (Rule 49.1(a-bis)).

3. Enclosed with this Notice is a copy of the international application as published by the International Bureau on 30 August 2001 (30.08.01) under No. WO 01/62152

REMINDER REGARDING CHAPTER II (Article 31(2)(a) and Rule 54.2)

If the applicant wishes to postpone entry into the national phase until 30 months (or later in some Offices) from the priority date, a demand for international preliminary examination must be filed with the competent International Preliminary Examining Authority before the expiration of 18 months from the priority date.

It is the applicant's sole responsibility to monitor the 18-month time limit.

Note that only an applicant who is a national or resident of a PCT Contracting State which is bound by Chapter II has the right to file a demand for international preliminary examination.

REMINDER REGARDING ENTRY INTO THE NATIONAL PHASE (Article 22 or 39(1))

If the applicant wishes to proceed with the international application in the national phase, he must, within 20 months or 30 months, or later in some Offices, perform the acts referred to therein before each designated or elected Office.

For further important information on the time limits and acts to be performed for entering the national phase, see the Annex to Form PCT/I8/301 (Notification of Receipt of Record Copy) and Volume II of the PCT Applicant's Guide.

| | |
|---|------------------------------------|
| The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland | Authorized officer J. Zahra |
| Facsimile No. (41-22) 740.14.35 | Telephone No. (41-22) 338.83.38 |